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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/070,504	04/30/2002	Jean-Christophe Fidalgo	032326-200	7008

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EXAMINER

BANGACHON, WILLIAM L

ART UNIT PAPER NUMBER

2635

DATE MAILED: 12/21/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/070,504

Applicant(s)

FIDALGO, JEAN-CHRISTOPHE

Examiner

William Bangachon

Art Unit

2635

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 30 April 2002.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-13 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-13 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 30 April 2002 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☒ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date 6.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

DETAILED ACTION

Specification

1. This application does not contain an abstract of the disclosure as required by 37 CFR 1.72(b). An abstract on a separate sheet is required.

Drawings

2. The drawings are objected to under 37 CFR 1.83(a). The drawings must show every feature of the invention specified in the claims. Therefore, the **“receiving antenna”** in claim 2, **“transmitting antenna”** in claim 12, must be shown or the feature(s) canceled from the claim(s). No new matter should be entered.

Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement-drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as “amended.” If a drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. The replacement sheet(s) should be labeled “Replacement Sheet” in the page header (as per 37 CFR 1.84(c)) so as not to obstruct any portion of

the drawing figures. If the examiner does not accept the changes, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

5. Claims 1, 3-11, and 13, are rejected under 35 U.S.C. 103(a) as being unpatentable over USP 5,180,901 (Hiramatsu) in view of USP 6,353,472 (Bault), and further in view of USP 4,729,128 (Grimes et al).

In claims 1 and 13, Hiramatsu teaches of an electronic/IC card (10) {Figures 1, 3} with individual authentication function comprising;

a permanent memory (7) in which there are stored characteristics for identifying the holder of the card,

an area (1) for receiving a signature / fingerprint to be authenticated,

processing means (8 or 9) for supplying dynamic characteristics of the signature to be authenticated,

means of comparing (8) the dynamic characteristics of the signature to be authenticated with the characteristics recorded in the permanent memory (26) in order to produce a validation signal,

a temporary memory (6) for storing at least one of the dynamic characteristics of the signature to be authenticated or for the validation signal supplied by the comparison means {paragraph bridging cols. 4 and 5}, and

means for powering of the processing means and/or the comparison means independently of a reader intended to read information from the card {col. 5, lines 40-58}.

Although Hiramatsu does not disclose expressly “a signature”, “a real image of a fingerprint is assimilable to a signature in the case of an authorized person who cannot or does not wish to sign, or in the case of important transactions requiring a high level of security as well as incontestable proof of performance”, as evidenced by Bault {Bault, col. 6, lines 22-30}. Further, Grimes et al teach that fingerprints, signatures, and the like are all-personal identifying data that may be included in a personal identification card system {Grimes et al, col. 2, lines 7-15}. Hiramatsu, Bault, and Grimes are in the same problem solving area, card identification systems. Therefore, at

the time of the invention, it would have been obvious to one of ordinary skill in the art to have a signature in the system of Hiramatsu because a fingerprint is assimilable to a signature, as evidenced by Bault. And fingerprints, signatures, and the like are included in a card for the purpose of heightening security.

In claim 3, a card according to Claim 1, including an internal energy source for powering the processing means and/or the comparison means {Hiramatsu, col. 5, lines 40-58}.

In claim 4, a card according to Claim 3, wherein the power source is of piezoelectric and/or pyroelectric type {Hiramatsu, col. 5, lines 40-58; Grimes, col. 5, lines 7-34}.

In claim 5, a card according to Claim 4, including at least one piezoelectric sheet for detecting the dynamic characteristics of the signature to be authenticated, wherein said piezoelectric sheet also used for producing the electrical energy necessary for the powering of processing means and/or comparison means {Hiramatsu, col. 5, lines 40-58; Grimes, col. 5, lines 7-34}.

In claim 6, a card according to claim 1, wherein the period of storage in the temporary memory (6) of the dynamic characteristics to be authenticated or of the validation signal is at most about one minute {Hiramatsu, col. 6, lines 47-61}.

In claim 7, a card according to claim 1, wherein said card includes contacts, and the signature area (1) authentication is distinct from the area of the contacts as shown in figures 1 and 3 .

In claim 8, a card according to claim 1, wherein the signature area (1) has piezoelectric sheet covered parallel conductive lines one face and parallel conductive lines on the other face, the lines on the two faces having different directions, one dynamic characteristics consisting of the writing pressure at each point or at selected points {Hiramatsu, col. 5, lines 40-58; Grimes, col. 5, lines 7-34}.

In claim 9, a card according to Claim 1, wherein the signature area has two superposed piezoelectric sheets, the upper face of the upper sheet having parallel conductive lines and the lower face of the lower sheet also having lines parallel to one another but with a different direction to the conductive lines of the upper sheet, and in that, in each of these sets of parallel lines, the lines of even rank are connected to the first terminal and the lines of odd rank are connected to a second terminal {Hiramatsu, col. 5, lines 40-58; Grimes, col. 5, lines 7-34}.

In claim 11, a card according to claim 1, further including means for inhibiting at least one function performed within the card, this inhibiting being the result of the

comparison between the dynamic characteristics of the signature to be authenticated and the characteristics recorded in permanent memory {Hiramatsu, col. 1, lines 12-20}.

6. Claims 2 and 12, are rejected under 35 U.S.C. 103(a) as being unpatentable over USP 5,180,901 (Hiramatsu) in view of USP 6,353,472 (Bault) and USP 4,729,128 (Grimes et al), and further in view of USP 6,489,883 (Iiyama et al).

With regards to claims 2 and 12, Hiramatsu does not teach "a receiving antenna for powering the processing means and/or the comparison means in the card and a transmitting antenna for powering the receiving antenna, and a support." Iiyama is cited in that it teaches of a data carrier comprising a receiving and transmitting antenna as claimed {Iiyama, paragraph-bridging cols. 3 and 4}. Iiyama suggests that these features are desirable in that it is unnecessary to insert the data carrier into a slot of a reader/writer to have power {Iiyama, col. 1, lines 10-27}. Therefore, it would have been obvious to one of ordinary skill in the art to have this source of power (wireless) in the system of Hiramatsu, as taught by Iiyama, because it will be unnecessary for the card of Hiramatsu to be inserted into a slot of a reader/writer to have power.

7. Claims 1, 10 and 13, are rejected under 35 U.S.C. 103(a) as being unpatentable over USP 5,150,420 (Haraguchi) in view of USP 5,180,901 (Hiramatsu).

In claims 1, 10, and 13, Haraguchi et al teaches of an electronic/IC card {Figures 2, 4} comprising;

a permanent memory (1) in which there are stored characteristics for identifying the holder of the card {col. 2, line 66-col. 3, line 2; paragraph bridging cols. 3 and 4},

an area (21) for receiving a signature to be authenticated as shown in figure 2 {col. 2, lines 25-42},

processing means (20) for supplying dynamic characteristics of the signature to be authenticated {col. 2, lines 50-54},

means of comparing the dynamic characteristics of the signature to be authenticated with the characteristics recorded in the permanent memory in order to produce a validation signal {col. 3, lines 58-65},

a temporary memory (23) for storing at least one of the dynamic characteristics of the signature to be authenticated or for the validation signal supplied by the comparison means {col. 2, lines 54-60}, and

means for powering of the processing means and/or the comparison means independently of a reader intended to read information from the card {col. 5, lines 40-58}.

Haraguchi does not disclose expressly "means for comparing to provide individual validation." Hiramatsu is cited in that it teaches of an IC card with individual authentication function, as claimed. Hiramatsu teaches that these features are desirable because it prevents illegal use of these cards by third parties {Hiramatsu, paragraph bridging cols. 1 and 2}. The systems of Haraguchi and Hiramatsu are in the same field of endeavor, security cards. Therefore, at the time of the invention, it would have been obvious to one of ordinary skill in the art to have means for comparing, as claimed, in

the system of Haraguchi, because it prevents illegal use of these cards, as taught by Hiramatsu.

Examiner Contact Information

8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to William Bangachon whose telephone number is (571)-272-3065. The examiner can normally be reached on 4/4/10.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael Horabik can be reached on (571)-272-3068. The fax phone numbers for the organization where this application or proceeding is assigned is 703-872-9314 for regular and After Final formal communications. The examiner's fax number is (571)-273-3065 for informal communications.

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Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-305-4700.

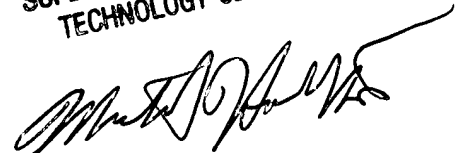
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William L Bangachon
Examiner
Art Unit 2635

November 30, 2004

MICHAEL HORABIK
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 2600

A handwritten signature in black ink, appearing to read "Michael Horabik", written in a cursive style.